



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/830,044

04/23/2004

Yasuhiro Ogata

Q80791

8714

23373 7590 03/24/2008
SUGHRUE MION, PLLC
2100 PENNSYLVANIA AVENUE, N.W.
SUITE 800
WASHINGTON, DC 20037

EXAMINER

SHEWAREGED, BETELHEM

ART UNIT

PAPER NUMBER

1794

MAIL DATE

DELIVERY MODE

03/24/2008

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/830,044	Applicant(s) OGATA ET AL.	
	Examiner Betelhem Shewareged	Art Unit 1794	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 11 January 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-3,5,6 and 8-27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-3,5,6 and 8-27 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>10/31/2007</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. Applicant's response along with the Request for Continued Examination (RCE) filed on 01/11/2008 has been fully considered. Claim 1 is amended, claims 4 and 7 are canceled, and claims 1-3, 5, 6 and 8-27 are pending.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-3, 5, 6 and 8-27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Majumdar et al. (US 6,475,696 B2) in further view of Ohbayashi et al. (US 6,492,005 B1) and Serizawa et al. (US 2002/0058589 A1).

4. Majumdar discloses an imaging member comprising an image layer and a support (abstract). The support comprises a paper sheet and a layer (also referred as "nanocomposite material"), wherein the layer comprises an inorganic particle such as mica having the claimed aspect ratio, and a resin such as polyvinyl alcohol. The layer further comprises optional components such as titanium oxide, zinc oxide, talc, calcium carbonate, zinc stearate and fatty amides. The layer may be applied on both sides of the support. (See col. 3, line 65 thru col. 4, line 52; col. 7, line 19 thru col. 8, line 26; col. 11, lines 1-11 and 64; and claims 1, 12 and 19). Majumdar does not disclose image layer as claimed. However, Ohbayashi teaches a recording sheet comprising a support

Art Unit: 1794

and an ink absorptive layer (abstract). The ink absorptive layer comprises a resin such as polyvinyl alcohol, gelatin and cellulose and a hardener such as boron compound (col. 13, line 61 and col. 15, line 52). Majumdar and Ohbayashi are analogous art because they are from the same field of endeavor that is the recording sheet art. At the time of the invention, it would have been obvious to a person of ordinary skill in the art to combine the ink absorptive layer of Ohbayashi with the invention of Majumdar so as to provide a recording sheet having enhanced image quality, drying property and water resistance property.

5. In Majumdar, the layer between the support and the image layer does not comprise water swellable synthetic mica as claimed. However, Serizawa teaches a recording material comprising a support, a resin layer on the support and a recording layer on the resin layer (abstract). The resin layer comprises a binder such as gelatin and polyvinyl alcohol, and water swellable synthetic mica having an aspect ratio of 100 or more ([0022], [0043] and [0061]-[0065]). Majumdar and Serizawa are analogous art because they are from the same field of endeavor that is the recording medium art. At the time of the invention, it would have been obvious to a person of ordinary skill in the art to combine the resin layer of Serizawa with the invention of Majumdar in order to prevent printed image defects (see [0024] of Serizawa).

Response to Arguments

6. Applicant's argument is based on that the resin layer in Serizawa is provided between a recording layer and a support so that the transfer of water vapor and gases

is prevented, resulting in the prevention of blistering. Serizawa fails to disclose a backcoat layer containing mica which is provided between the support and the recording layer, and Serizawa fails to disclose that the resin layer can be provided in any region other than the region between the recording layer and the support. The Office fails to point out any passage that provides any motivation to one having ordinary skill in the art to apply the layer to the backcoat layer. The Office is relying upon hindsight, a rejection derived after consideration of Applicants' application, which is not proper. This argument is not persuasive for the following reason.

7. The test for obviousness is not whether the features of a secondary reference may be bodily incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981). In this case, the resin layer of Serizawa is provided between the support and the recording layer (abstract and [0023]), wherein the resin layer comprises water swellable synthetic mica having an aspect ratio of 100 or more ([0061]-[0065]). The resin layer of Serizawa is combined with the invention of Majumdar. Majumdar teaches applying the layer containing mica to be applied on both sides of the substrate. Thus the combination of Serizawa and Majumdar teach the claimed backcoat layer and the claimed undercoat layer.

8. In response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning, it must be recognized that

Art Unit: 1794

any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971).

9. For the above reason claims 1-3, 5, 6 and 8-27 stand rejected.

Conclusion

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Betelhem Shewareged whose telephone number is 571-272-1529. The examiner can normally be reached on Mon.-Fri. 8:00AM-4:30PM.

11. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Milton Cano can be reached on 571-272-1398. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 1794

12. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

BS

March 16, 2008.

/Betelhem Shewareged/
Primary Examiner, Art Unit 1794